

CLAIMS

1. The use of the oleuropein compound or of one derivative thereof for making a composition to be used for stimulating bone formation and/or for inhibiting bone resorption for humans or animals.

2. The use according to claim 1, characterized in that said composition is a nutritional composition suitable for oral administration.

3. The use according to claim 2, characterized in that said nutritional composition is to be used for stimulating bone formation for young individuals being in growth period.

4. The use according to claim 2, characterized in that said nutritional composition is to be used for preventing bone loss which occurs with aging.

5. The use according to claim 2, characterized in that said nutritional composition is to be used for preventing or treating disorders associated with an unbalanced bone formation-bone resorption ratio.

6. The use according to claim 2, characterized in that said nutritional composition is to be used for treating a bone deficiency resulting from a fracture.

7. The use according to claim 2, characterized in that said nutritional composition is to be used for preventing or for treating conditions from the group consisting of type I or type II osteoporosis, secondary osteoporosis, Paget's disease, bone loss or osteolysis observed at the vicinity of a prosthesis, metastatic bone diseases, cancer induced hypocalcemia, multiple myeloma, periodontal diseases or osteoarthritis.

8. The use according to anyone of claims 2 to 7, characterized in that said nutritional composition comes as food compositions, beverages, comprising juices (fruits or vegetables), oils, butters, margarines, vegetal fats, cans (for example tuna fish in oil), soups, milk-based preparations (yogurts, cottage cheese), ice creams, cheeses (for example oil-kept cheeses), baked products (such as bread, cookies and cakes), puddings, confectionary products, cereal bars, breakfast cereals, condiments, seasoning products (especially spices and dressings).

9. The use according to anyone of claims 2 to 7, characterized in that said nutritional composition comes as a product for animal feeding, in a wet, half-wet or dry form.

10. The use according to anyone of claims 2 to 9, characterized in
5 that the oleuropein compound or one derivative thereof comes as an extraction product from a plant belonging to the *Oleaceae* family.

11. The use according to claim 10, characterized in that the extraction product is a product extracted from the stems, the leaves, the fruits or the stones of a plant belonging to the *Oleaceae* family.

10 12. The use according to anyone of claim 10 or 11, characterized in that the plant belonging to the *Oleaceae* family is selected from the group consisting of *olea europaea*, a plant of genus *Ligustrum*, a plant of genus *Syringa*, a plant of genus *Fraxinus*, a plant of genus *Jasminum* and a plant of genus *Osmanthus*.

15 13. The use according to anyone of claims 10 to 12, characterized in that the extraction product is an olive oil or an oleuropein rich extract from olive oil or leaves.

14. The use according to anyone of claims 2 to 14, characterized in that said nutritional composition is suitable for the daily oral
20 administration in an amount ranging from 0.01 to 200 mg of the oleuropein compound or one derivative thereof.

15. Nutritional composition for stimulating bone formation and/or inhibiting bone resorption, characterized in that it comprises, as active nutritional compound, the oleuropein compound or one derivative thereof.

25 16. The use according to claim 1, characterized in that said composition is a human or animal pharmaceutical composition.

17. The use according to claim 16, characterized in that said pharmaceutical composition is to be used for stimulating bone formation for the young individual being in the growth period.

30 18. The use according to claim 16, characterized in that said pharmaceutical composition is to be used for preventing bone loss that occurs with aging (osteopenia).

19. The use according to claim 16, characterized in that said pharmaceutical composition is to be used for preventing or treating a

pathology associated with an unbalanced bone formation-bone resorption ratio.

20. The use according to claim 16, characterized in that said pharmaceutical composition is to be used for treating a bone deficiency
5 resulting from a fracture.

21. The use according to claim 16, characterized in that said composition is to be used for preventing or treating a pathology from the group consisting of type I or type II osteoporosis, secondary osteoporosis, Paget's disease, bone loss or osteolysis observed at the
10 vicinity of a prosthesis, metastatic bone diseases, cancer induced hypercalcemia, multiple myeloma, periodontal diseases or osteoarthritis.

22. The use according to anyone of claims 16 to 21, characterized in that said pharmaceutical composition is in a suitable form for oral, parenteral, intramuscular or intravenous administration.

15 23. The use according to anyone of claims 16 to 21, characterized in that said pharmaceutical composition is suitable for a daily oral administration in an amount ranging from 0.01 to 200 mg of the oleuropein compound or one derivative thereof.

20 24. Human or animal pharmaceutical composition for stimulating bone formation and/or for inhibiting bone resorption, characterized in that it comprises as active compound the oleuropein compound or one derivative thereof.